



United States Patent and Trademark Office

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/878,401	06/12/2001	Jae Yong Park	2658-0268P	2192
2292 7	7590 05/12/2004		EXAMINER	
BIRCH STEWART KOLASCH & BIRCH			NGUYEN, JENNIFER T	
PO BOX 747 FALLS CHUR	PO BOX 747 FALLS CHURCH, VA 22040-0747			PAPER NUMBER
111223 31131	,		2674	7
			DATE MAIL ED: 05/12/2004	4 /

Please find below and/or attached an Office communication concerning this application or proceeding.

fr

		Δ.				
	Application No.	Applicant(s)				
_	09/878,401	PARK, JAE YONG				
Office Action Summary	Examiner	Art Unit				
	Jennifer T Nguyen	2674				
The MAILING DATE of this communication app Period for Reply	ears on the cover sheet with the	correspondence address				
A SHORTENED STATUTORY PERIOD FOR REPLY THE MAILING DATE OF THIS COMMUNICATION. - Extensions of time may be available under the provisions of 37 CFR 1.13 after SIX (6) MONTHS from the mailing date of this communication. - If the period for reply specified above is less than thirty (30) days, a reply - If NO period for reply is specified above, the maximum statutory period w - Failure to reply within the set or extended period for reply will, by statute, Any reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b).	86(a). In no event, however, may a reply be ti within the statutory minimum of thirty (30) da vill apply and will expire SIX (6) MONTHS from cause the application to become ABANDONE	mely filed ys will be considered timely. In the mailing date of this communication. ED (35 U.S.C. § 133).				
Status						
1) Responsive to communication(s) filed on 12 Ju	ine 2001.					
	action is non-final.					
3) Since this application is in condition for allowar	Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.					
Disposition of Claims						
4) ☐ Claim(s) 1-10 is/are pending in the application. 4a) Of the above claim(s) is/are withdray 5) ☐ Claim(s) is/are allowed. 6) ☐ Claim(s) 1-10 is/are rejected. 7) ☐ Claim(s) is/are objected to. 8) ☐ Claim(s) are subject to restriction and/or	vn from consideration.					
Application Papers						
9)☐ The specification is objected to by the Examine 10)☒ The drawing(s) filed on 12 June 2001 is/are: a) Applicant may not request that any objection to the o Replacement drawing sheet(s) including the correction 11)☐ The oath or declaration is objected to by the Ex	☑ accepted or b)☐ objected to drawing(s) be held in abeyance. Se ion is required if the drawing(s) is ot	ee 37 CFR 1.85(a). ojected to. See 37 CFR 1.121(d).				
Priority under 35 U.S.C. § 119						
12) Acknowledgment is made of a claim for foreign a) All b) Some * c) None of: 1. Certified copies of the priority documents 2. Certified copies of the priority documents 3. Copies of the certified copies of the priori	s have been received. s have been received in Applicatity documents have been receiv I (PCT Rule 17.2(a)).	tion No ed in this National Stage				
Attachment(s)						
1) Notice of References Cited (PTO-892) 2) Notice of Draftsperson's Patent Drawing Review (PTO-948) 3) Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)	4) Interview Summary Paper No(s)/Mail D 5) Notice of Informal					
Paper No(s)/Mail Date	6) Other:					

Application/Control Number: 09/878,401

Art Unit: 2674

DETAILED ACTION

1. This Office action is responsive to Amendment filed on 02/18/2004.

Claim Rejections - 35 USC § 103

- 2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 3. Claims 1-10 are rejected under 35 U.S.C. 103(a) as being unpatentable over conventional art Figs. 5 and 6, cited by Applicant, in view of Nitta (U.S. Patent No. 6,275,220).

Regarding claim 1, the conventional art Figs. 5 and 6 teaches an electro-luminescence display comprising: an electro-luminescence panel (30) having a display area and a non-display area, driving circuit boards (6, 7) for applying driving signals to a gate line and a data line provided on a surface of the electro-luminescence panel (30) wherein the tape carrier packages (12) and the driving circuit boards (7) are disposed upon the non-display area within the panel (in specification from page 4, line 23 to page 5, line 6).

The conventional art Fig. 5 differs from claim 1 in that it does not specifically teach the tape carrier packages connecting the driving circuit boards and the electro-luminescence panel in a planar state. However, referring to Figs. 1 and 2, Nitta teaches the tape carrier packages (20) connecting the driving circuit boards (22) and the electro-luminescence panel (11) in a planar state (col. 2, lines 24-53 and from col. 3, line 54 to col. 4, line 2). Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to incorporate the tape carrier packages connecting the driving circuit boards and the electro-luminescence panel in

Application/Control Number: 09/878,401

Art Unit: 2674

a planar state as taught by Nitta in the system of conventional art Figs. 5 and 6 in order to provide a display that is capable of being made having a small thickness.

Regarding claim 2, the conventional art Figs. 5 and 6 further teaches the driving circuit boards include: a gate driving circuit (6) for applying driving signals to the gate lines; and a data driving circuit (7) for applying driving signals to the data lines (in specification from page 4, line 23 to page 5, line 6).

Regarding claims 3-5, the conventional art Figs. 5 and 6 further teaches the driving circuit boards include a plurality of output pads electrically connected to the tape carrier packages (14) and panel (30) includes a plurality of input pads (26) that are provided at the non-display area and electrically connected to the tape carrier packages (14) (in specification from page 4, line 23 to page 5, line 6).

Regarding claim 6, the conventional art Figs. 5 and 6 further teaches the tape carrier packages include: a first group of tape carrier packages (14) arranged between the panel (30) and the gate driving circuit (6) and a second group of tape carrier packages (14) arranged between the panel (30) and the data driving circuit (7) (in specification from page 4, line 23 to page 5, line 6).

Regarding claim 7, the conventional art Figs. 5 and 6 further teaches the tape carrier packages (14) has a first side for connecting the driving circuit boards (7) to the panel (30) and a second side for holding a computer chip (IC 14) (in specification from page 4, line 23 to page 5, line 6).

Regarding claims 8-10, the combination of the conventional art Figs. 5 and 6 and Nitta teaches a substantial portion of each of said tape carrier packages (20) having a first portion disposed in a common plane with said driving circuit boards (22) and connected to the panel and

Application/Control Number: 09/878,401

Art Unit: 2674

a second portion disposed in a contiguous plane to the common plane of said panel and said first portion (col. 2, lines 24-53 of Nitta).

Response to Arguments

4. Applicants' arguments filed 02/18/2004, have been fully considered but they are not persuasive because as follows:

In response to Applicants' argument filed "The panel shown is a plasma display panel. The Applicant's claims recite an electro-luminescence panel. The Applicant's claimed device is hereby distinguished over Nitta". However, Nitta teaches the display panel may well be an electro-luminescence (from col. 3, line 54 to col. 4, line 2). The Applicants' argument also filed "the flexible printed wired board is positioned outside the panel". However, the conventional figures 5 and 6 shown the TCP and the driving circuit are secured to the non-display area of the EL panel (in specification from page 4, line 23 to page 5, line 6). Accordingly, additional space is not required for positioning the TCP and the driving circuit boards.

Therefore, it is believed that the conventional art figures 5 and 5 and Nitta still read on the claims invention and the rejection is maintained.

5. THIS ACTION IS MADE FINAL. Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37

-Art Unit: 2674

CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to **Jennifer T. Nguyen** whose telephone number is **703-305-3225**. The examiner can normally be reached on Mon-Fri from 9:00-5:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Richard A Hjerpe can be reach at 703-305-4709.

Any response to this action should be mailed to:

Commissioner of Patents and Trademarks

Washington, DC. 20231

Or faxed to: 703-872-9306 (for Technology Center 2600 only)

Hand-delivered responses should be brought to Crystal Park II, 2121 Crystal Drive, Arlington, VA, sixth-floor (Receptionist).

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the Technology Center 2600 Customer Service Office whose telephone number is 703-306-0377.

JNguyen 5/6/04

REGINA LIANG